

### Abstract

A deterioration detector, for a pulse detector with which a transmission signal from a transmitting element suffers changes due to the blood stream and the vascular wall to be received in the form of a reflected signal and the resultant reflected signal is processed to obtain a pulse signal, includes a second transmitting element and a second receiving element.

A second transmitting element and a second receiving element are disposed in a deterioration detector so that when a pulse detector having a pulse sensor device constituted by a first transmitting element and a first receiving element is installed in the deterioration detector, the first transmitting element and the second receiving element face each other and the first receiving element and the second transmitting element face each other. A level of a received output signal of the second receiving element when the first transmitting element is driven is compared with a threshold value to thereby allow the progress of deterioration of the first transmitting element to be quantitatively detected. Moreover, data history of the deterioration detector is remotely managed to allow a deterioration detecting system for estimating failure time to be constructed.